



MSMR



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Contents

| | |
|--|----|
| Breast cancer among female soldiers, 1998-1999 | 2 |
| Acquired hallux valgus (bunions), US Armed Forces, 1998-1999 | 6 |
| Reportable events, US Army, third quarter, 2000 | 9 |
| ARD surveillance update | 13 |
| Assault-related hospitalizations, active duty military personnel, 1990-1999 (revised) | 14 |
| Sentinel reportable events by reporting facility | 16 |
| Sentinel reportable events, active duty soldiers | 18 |
| Active duty force strength (June 2000) | 19 |

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Surveillance Trends

Breast Cancer among Female Soldiers, US Army, 1998-1999

Breast cancer is the second leading cause of cancer deaths among women.¹ During the year 2000 in the United States, it is estimated that 183,000 new cases of breast cancer will be diagnosed and nearly 41,000 women will die from the disease.¹ Early detection is the best weapon in the fight against breast cancer since early detection leads to early diagnosis.¹ Ninety percent of women whose breast cancers are detected and treated early can expect to be disease free after 5 years.¹

The American Cancer Society recommends that women younger than 40 perform breast self examinations (BSE) every month and have breast examinations by a physician every 3 years. Recent surveys among nonmilitary women in the US have found discordances between their knowledge and practices regarding the early detection of breast cancer. For example, while their knowledge of BSE is high, as high as 92% in some surveys,² their practice of BSE is low, ranging from 20% to 40%.³⁻⁶

This study was designed to document rates of malignant breast cancer diagnoses among female active duty soldiers, more than 90% of whom are younger than 40 years old, and to assess practices of female soldiers in regard to self- and physician-conducted breast examinations.

Methods. The study period was January 1998 to December 1999. A breast cancer case was defined as a woman on active duty in the US Army who had a primary diagnosis of "malignant neoplasm of the female breast" (ICD-9-CM 174.xx) during an outpatient visit or hospital admission during the study period. All females who served in the US Army during the study period were included in denominators for rate calculations.

The Health Risk Appraisal (HRA) is a self-administered questionnaire that is completed during in processing to the military, as part of physical examinations, during changes of duty stations, and for a variety of other reasons. For this study, behaviors related to the early detection of breast cancer were estimated from the responses of female soldiers who completed a Health Risk Appraisal (HRA) during the study period. If a female soldier completed more than one HRA during the study period, only the first was used for analyses.

Results. In 1998 and 1999, there were 119 cases of breast cancer reported among active duty US Army women. The overall incidence rate was 0.85 per 1,000 person-years. As expected, rates of breast cancer increased with age. For example, the rate was

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Table 1. Malignant neoplasm of the breast, US Army women, 1998-1999

| Characteristics | 17-24 years old | | 25-34 years old | | 35 and older | | Total | |
|-----------------|-----------------|-----------------------------|-----------------|-----------------------------|--------------|-----------------------------|-------|-----------------------------|
| | Cases | Rate per 1,000 person-years | Cases | Rate per 1,000 person-years | Cases | Rate per 1,000 person-years | Cases | Rate per 1,000 person-years |
| Total | 16 | 0.27 | 33 | 0.61 | 70 | 2.66 | 119 | 0.85 |
| Race | | | | | | | | |
| White | 9 | 0.30 | 16 | 0.71 | 28 | 2.56 | 53 | 0.83 |
| Black | 4 | 0.18 | 13 | 0.50 | 36 | 2.84 | 53 | 0.87 |
| Other | 3 | 0.43 | 4 | 0.67 | 6 | 2.30 | 13 | 0.83 |
| Rank | | | | | | | | |
| Enlisted | 14 | 0.25 | 26 | 0.59 | 44 | 2.43 | 84 | 0.70 |
| Officer | 2 | 0.73 | 7 | 0.70 | 26 | 3.20 | 35 | 1.68 |

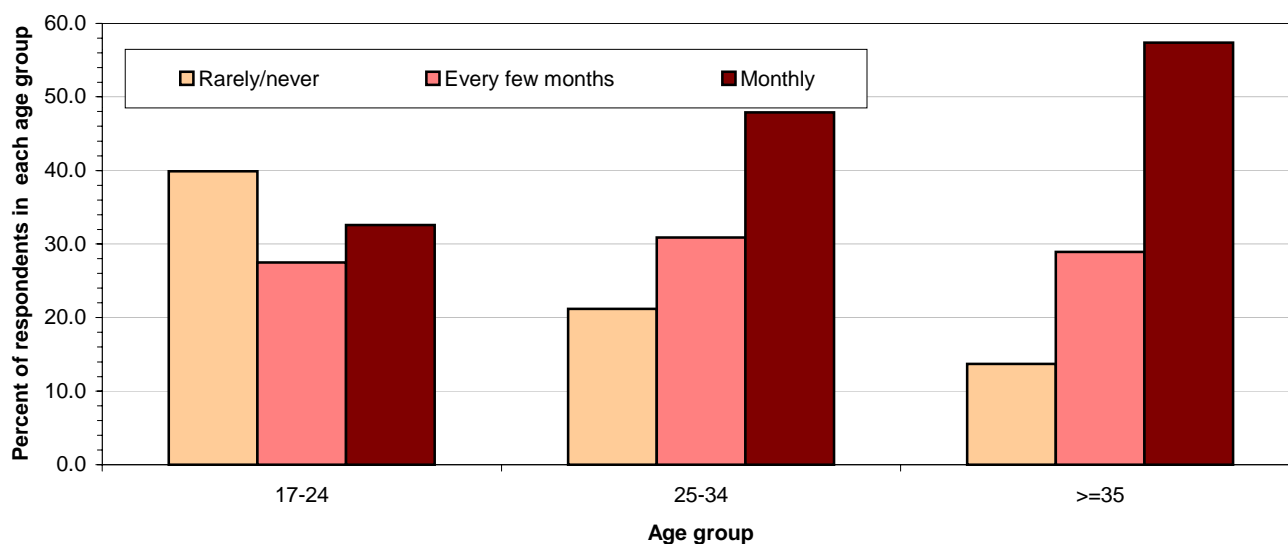
Figure 1. Frequency of breast self examinations, by age, US Army women, 1998-1999

Figure 2. Percent of female soldiers who reported monthly breast self examinations, by family history of breast cancer and age, US Army, 1998-1999

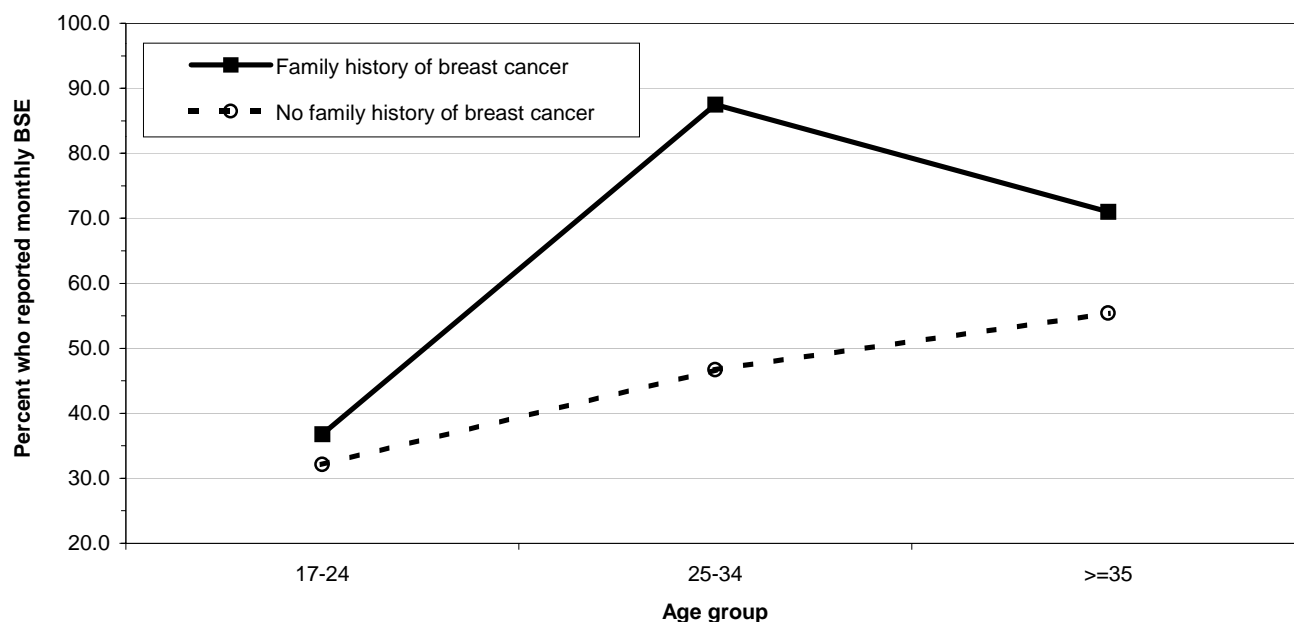
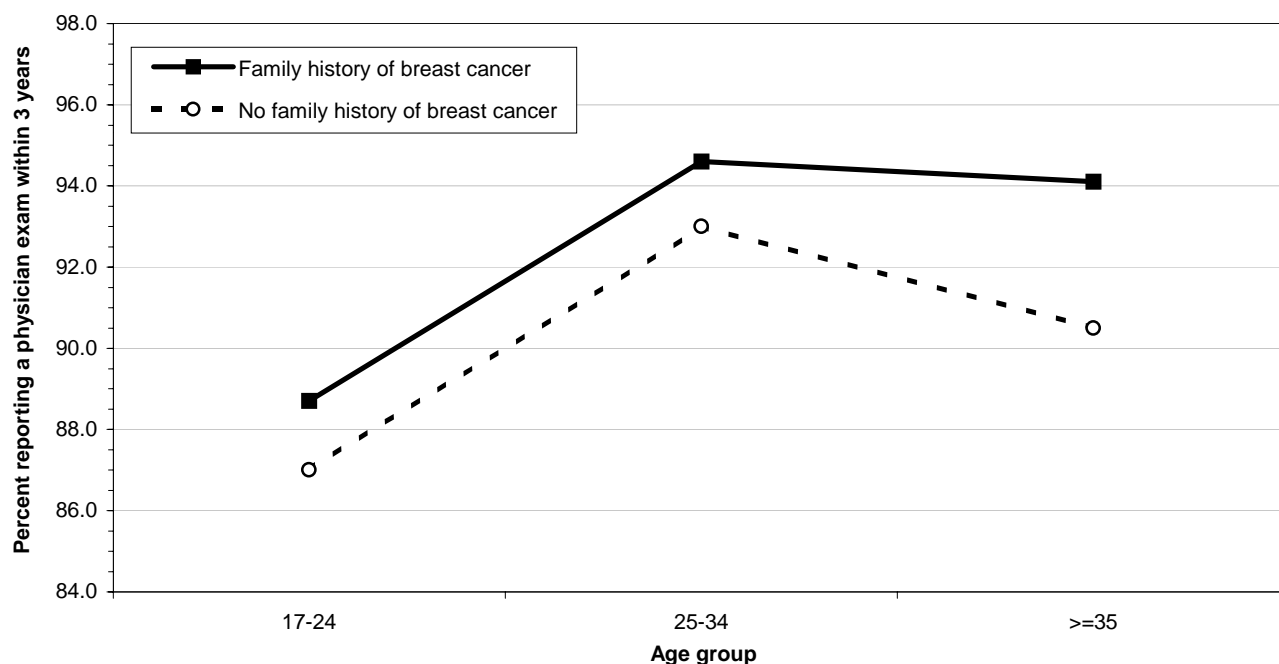


Figure 3. Percent of female soldiers who reported a physician-conducted breast examination within 3 years, by family history of breast cancer and age, US Army, 1998-1999



approximately 10-times higher among women older than 35 than among those younger than 25 (table 1, page 3). There were minimal differences in relation to race (table 1).

During the study period, 4,637 female soldiers responded to all of the breast cancer screening questions on the HRA. The average age of respondents was 27.1 years old, approximately half (51%) represented black or "other" non-white racial groups, and 28% had less than 1 year of military service and 40% less than 2 years. Approximately 11% (n=496) of respondents reported that one or more of their family members had had breast cancer.

Overall, fewer than half (42.4%) of all respondents reported monthly breast self-examinations. The proportions that reported monthly breast self-examinations increased sharply with age (figure 1, page 3). Women older than 35 were 1.8-times more likely than those younger than 25 to report monthly breast self-examinations (figure 1). Female soldiers over 25 with family histories of breast cancer were much more likely than those without family histories to report monthly breast self examinations (figure 2).

Overall, 90% of respondents reported physician-conducted breast examinations within 3 years (figure 3). There was relatively little variation in relation to age or family history; for example, 86% to 95% of all age- and family history-defined subgroups reported physician-conducted examinations within 3 years.

Editorial comment: Breast cancer occurs relatively infrequently among the generally healthy young women who serve in the US Army. As expected, breast cancer rates among female soldiers increased significantly with age; in fact, nearly 60% of cases occurred among the less than 20% of female soldiers who were older than 35. Still, since breast cancers in their early stages are so amenable to treatment and cure, behaviors directed at its early detection should

be encouraged among female soldiers of all ages.

The results of this survey document that most female soldiers, regardless of their ages or family histories, were examined by a physician within three years. This is not surprising since soldiers undergo mandatory periodic physical examinations and have free access to medical care. In contrast, the behaviors of female soldiers regarding breast self-examinations vary significantly with age and family history. For example, women older than 25 and those with family histories of breast cancer were more likely than their counterparts to report monthly breast self-examinations. Even then, however, more than 40% of all women over 35 and nearly 30% of those with positive family histories reported that they did not do monthly breast self-examinations. To the extent that these results reflect the current knowledge, attitudes, and behaviors of female soldiers in general, they call for renewed and innovative efforts directed at enhancing early breast cancer detection practices.

Analysis and report by Scott Barnett, PhD, Data Analysis Group, AMSA.

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Surveillance Trends

Acquired Hallux Valgus (“Bunions”) in the US Armed Forces, 1998-1999

Injuries among military personnel are a significant source of morbidity, mortality, disability, and lost duty time.¹⁻⁴ Many activities unique to the military involve marching (often with heavy loads), running, jumping, and standing for long periods. In addition, many military members participate in recreational activities that involve running, jumping, hiking, and physical contact. As a result, servicemembers are a high risk group for overuse and acute traumatic injuries of the foot.⁵ Many foot-related injuries if not treated immediately and allowed to heal thoroughly can result in chronic or recurrent injuries and major prolonged disabilities.⁶

Acquired hallux valgus is a disorder characterized by deviation of the great toe towards the midline of the foot due to a deformity of the joint at the base of the great toe. The condition is often accompanied by a bony outgrowth (bunion) at the base of the great toe. Because bunions often are pressure points, they are susceptible to irritation and inflammation, particularly from constrictive footwear and prolonged stressful, high impact, or traumatic activities.

The causes of acquired hallux valgus and bunions are unclear. Most cases probably manifest interactions between genetic susceptibilities (e.g., foot structure) and environmental stresses (e.g., footwear). The extreme excess of cases in women versus men in the US and the virtual absence of cases in locations where shoes are not worn⁶ suggest that tight fitting shoes are a significant etiologic factor.

Acquired hallux valgus and bunions are among the most common foot-related disorders of military servicemembers. The purpose of this report is to describe rates and correlates of risk of acquired hallux valgus among active duty members of the US Armed Forces.

Methods. Standard ambulatory data records and standard inpatient data records, maintained in the Defense Medical Surveillance System, were searched to identify all medical encounters among active duty military personnel from January 1998 through December 1999 with a primary diagnosis of acquired hallux valgus (ICD-9-CM code 735.0). An incident case was defined as the first inpatient or outpatient

visit during the study period. Incidence rates for ambulatory visits (per 1,000 person-years) and for hospitalizations (per 100,000 person-years) were calculated by gender, age, service, grade, race, and occupation.

Results. During the period, there were 167 hospitalizations (of 142 individuals) and 15,387 ambulatory clinic visits (by 5,639 individuals) with primary diagnoses of acquired hallux valgus. Overall, the rate of incident ambulatory visits was 2.1 per 1,000 person-years, and the rate of hospitalizations was 5.2 per 100,000 person-years (table 1).

Relative rates in demographic subgroups were remarkably similar in the inpatient and outpatient settings (table 1). For example, rates of ambulatory visits and hospitalizations for acquired hallux valgus were approximately 5 times higher among females than males and generally increased with age. Rates of inpatient and outpatient encounters were more than twice as high among Black (compared to White and “other”) servicemembers.

Soldiers had higher rates of hospitalizations and ambulatory visits than their Navy, Air Force, or Marine counterparts. With control for age (data not shown), rates of ambulatory visits and hospitalizations were higher among enlisted members than officers and among those in lower grades than in higher grades. Among enlisted persons, “health care specialists” had higher rates of ambulatory visits and hospitalizations for acquired hallux valgus than any other occupational group. Among officers, “health care officers” had the second highest rate of ambulatory visits (table 1). Officers (“tactical operations officers”) and enlisted members (“infantry, gun crews, and seamanship”) in combat-specific occupational groups had relatively low rates of both ambulatory visits and hospitalizations for acquired hallux valgus (table 1).

Editorial comment. Acquired hallux valgus is often attributed to the wear of tight-fitting shoes. It may also be a sequela of chronic or recurrent injuries to the metatarsophalangeal joint of the great toe. Prevention measures include the wear of shoes and

Table 1. Inpatient and ambulatory clinic visits for acquired hallux valgus (ICD-9-CM code 735.0), active duty US Armed Forces, 1998-1999

| Characteristics | Hospitalizations | | | | Ambulatory Visits | | | |
|---|------------------|------------|---------------------------|----------------|-------------------|--------------|-------------------------|----------------|
| | Number | | Incidence rate/100,000 | Rate ratios | Number | | Incidence rate/1,000 | Rate ratios |
| | Hosps | Persons | | | Visits | Persons | | |
| Total | 167 | 142 | 5.2 | - | 15,387 | 5,639 | 2.1 | - |
| Gender | | | | | | | | |
| Female | 81 | 66 | 17.1 | 5.3 | 7,390 | 2,531 | 6.5 | 5.0 |
| Male | 86 | 76 | 3.2 | 1.0 | 7,997 | 3,108 | 1.3 | 1.0 |
| Age Group | | | | | | | | |
| <20 | 8 | 6 | 2.6 | 1.0 | 547 | 300 | 1.3 | 1.0 |
| 20-24 | 46 | 38 | 4.6 | 1.7 | 3,838 | 1,365 | 1.6 | 1.3 |
| 25-29 | 38 | 32 | 5.6 | 2.1 | 3,167 | 1,093 | 1.9 | 1.5 |
| 30-34 | 25 | 23 | 5.2 | 2.0 | 2,554 | 908 | 2.0 | 1.6 |
| 35-39 | 24 | 20 | 4.9 | 1.9 | 2,799 | 990 | 2.4 | 1.9 |
| >39 | 26 | 23 | 8.9 | 3.4 | 2,482 | 983 | 3.8 | 2.9 |
| Service | | | | | | | | |
| Army | 106 | 91 | 9.6 | 5.5 | 7,836 | 2,705 | 2.9 | 1.8 |
| Navy | 22 | 19 | 2.6 | 1.5 | 3,495 | 1,279 | 1.7 | 1.1 |
| Air Force | 33 | 26 | 3.6 | 2.1 | 2,702 | 1,123 | 1.6 | 1.0 |
| Marines | 6 | 6 | 1.8 | 1.0 | 1,354 | 532 | 1.6 | 1.0 |
| Grade | | | | | | | | |
| Junior enlisted | 73 | 61 | 5.0 | 1.7 | 6,433 | 2,257 | 1.8 | 1.2 |
| Senior enlisted | 73 | 63 | 5.8 | 2.0 | 7,140 | 2,579 | 2.4 | 1.6 |
| Junior officer | 9 | 8 | 3.0 | 1.0 | 960 | 409 | 1.5 | 1.0 |
| Senior officer | 12 | 10 | 5.8 | 1.9 | 854 | 398 | 2.3 | 1.5 |
| Race | | | | | | | | |
| White | 87 | 69 | 3.6 | 1.0 | 7,738 | 3,042 | 1.6 | 1.0 |
| Black | 66 | 59 | 10.6 | 3.0 | 6,519 | 2,158 | 3.9 | 2.4 |
| Other | 14 | 14 | 5.4 | 1.5 | 1,119 | 435 | 1.7 | 1.1 |
| Occupations | | | | | | | | |
| Enlisted | | | | | | | | |
| Health care specialists | 24 | 19 | 11.7 | 10.4 | 2,033 | 653 | 4.0 | 2.9 |
| Functional support and admin | 34 | 33 | 8.6 | 7.6 | 3,265 | 1,167 | 3.0 | 2.2 |
| Service and supply handlers | 16 | 13 | 6.7 | 6.0 | 1,511 | 449 | 2.3 | 1.7 |
| Craftworkers | 4 | 4 | 4.9 | 4.4 | 445 | 155 | 1.9 | 1.4 |
| Communications & intelligence specialists | 16 | 11 | 5.2 | 4.6 | 1,021 | 387 | 1.8 | 1.3 |
| Other technical & allied specialists | 6 | 5 | 7.1 | 6.3 | 359 | 131 | 1.9 | 1.4 |
| Infantry, gun crews, & seamanship | 25 | 21 | 4.6 | 4.1 | 1,815 | 714 | 1.6 | 1.1 |
| Electrical/mech equipment repairers | 10 | 9 | 2.0 | 1.7 | 1,973 | 706 | 1.5 | 1.1 |
| Electronic equipment repair | 10 | 8 | 3.9 | 3.4 | 867 | 302 | 1.5 | 1.1 |
| Non-occupational (includes trainees) | 1 | 1 | 1.1 | 1.0 | 200 | 122 | 1.4 | 1.0 |
| Unknown | - | - | - | - | 84 | 50 | 1.9 | 1.4 |
| Officer | | | | | | | | |
| General officers & executives, NEC | 1 | 1 | 14.5 | - | 50 | 25 | 3.6 | 3.9 |
| Health care officers | 7 | 5 | 7.0 | - | 494 | 222 | 3.1 | 3.3 |
| Administrators | 1 | 1 | 3.4 | - | 235 | 86 | 2.9 | 3.1 |
| Supply, procurement, & allied officers | 3 | 3 | 8.3 | - | 199 | 92 | 2.6 | 2.7 |
| Intelligence officers | 1 | 1 | 4.8 | - | 106 | 41 | 2.0 | 2.1 |
| Scientists and professionals | 1 | 1 | 3.9 | - | 106 | 46 | 1.8 | 1.9 |
| Engineering and maintenance officers | 6 | 5 | 9.1 | - | 248 | 86 | 1.6 | 1.7 |
| Non-occupational or unknown | - | - | - | - | 72 | 41 | 1.4 | 1.5 |
| Unknown | - | - | - | - | 53 | 28 | 1.3 | 1.3 |
| Tactical operations officers | 1 | 1 | 0.7 | - | 251 | 136 | 0.9 | 1.0 |

boots that provide proper room and support to the forefoot and toes. Proper footwear is particularly important during activities that require rapid starting (e.g., soccer, racquetball), stopping (e.g., parachute landings), and quick lateral movements (e.g., basketball). The relatively high rates among health care workers in this survey may reflect the relative overrepresentation of females in medical occupations and perhaps better access to medical care by health care workers. Still, proper footwear for health care workers (particularly those who are on their feet for long periods) is a potentially important preventive measure.

Finally, if the joint at the base of the great toe is acutely injured, it should be allowed to heal thoroughly before stressful activities are resumed. After a turf-toe injury, for example, the joint at the base of the great toe may stiffen, its mobility and range of motion may decrease, and its susceptibility to reinjury may increase.⁷ If the toe is injured chronically or

recurrently, joint instability, bone spurs, chronic pain, and occupational disabilities may occur.

Data analysis and report by Sandra Lesikar, PhD, Data Analysis Group, AMSA.

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Reportable Events, US Army, Third Quarter, 2000

In the US Army, medical surveillance of infectious diseases and other conditions of particular military operational and/or public health importance is conducted through the Army's Reportable Medical Events System (RMES). Automated reporting of notifiable medical events has been conducted Armywide since 1995. Currently, 34 preventive medicine activities in the United States, Korea, and Europe electronically transmit reportable medical events data to the Army Medical Surveillance Activity (AMSA) in Washington, DC. AMSA compiles, summarizes, and disseminates reports of frequencies, rates, trends, and correlates of risk of reportable conditions. A Department of Defense consensus list prescribes 70 conditions that are reportable in the Army and other Services.¹

Between October 1999 and September 2000, 14,561 cases of reportable medical events—an average of 40 per day—were reported to AMSA (table S1). There were approximately 14% more reports during the period than during the preceding 12 months. Between October 1999 and September 2000, sexually transmitted diseases accounted for approximately 88% of all reportable events—the proportion was similar to that of the prior year. “*Chlamydia trachomatis* genital infection” was the most frequently reported notifiable condition (table S2).

In relation to the average of the prior three years, there were approximately three-times as many reports of influenza and twice as many reports of heat injuries (figure S1). The increase in reports of influenza reflects enhanced efforts at some installations to monitor influenza-like illness activity in high-risk populations and settings (e.g., basic training).² Reports of heat injuries have increased each year since automated reporting began. The trend undoubtedly reflects continuing improvements in

the ascertainment and reporting of notifiable heat injury cases.² It is noteworthy, however, that in the past year, there were significantly more heat exhaustion case reports but fewer heat stroke reports. The finding may reflect improvements in the detection and clinical management of soldiers in the early stages of heat injury pathogenesis.

In contrast, relative to the average of the prior three years, there were approximately 38% fewer frostbite cases, 38% fewer hepatitis B cases, and 19% fewer varicella cases reported. The decline in frostbite cases reflects the fact that in the continental United States the winter of 1999–2000 was the warmest since 1900.³ The decreases in hepatitis B and varicella case reports may reflect the effects of expanded uses of vaccines against these viruses in high risk populations and settings.^{4–7}

Report submitted by Abigail Wilson, MPH, Data Analysis Group, AMSA.

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**Table SI. Reportable events, US Army medical treatment facilities,¹
cumulative events for all beneficiaries, October 1999-September 2000²**

| Diagnosis ³ | Oct-Dec 1999 | Jan-Mar 2000 | Apr-Jun 2000 | Jul-Sep 2000 | Diagnosis ³ | Oct-Dec 1999 | Jan-Mar 2000 | Apr-Jun 2000 | Jul-Sep 2000 |
|-----------------------------------|-----------------|-----------------|-----------------|-----------------|----------------------------------|-----------------|-----------------|-----------------|-----------------|
| All reportable events | 3120 | 4305 | 4085 | 3028 | Listeriosis | - | - | - | - |
| Amebiasis | - | 2 | 1 | - | Lyme disease | 16 | 5 | 19 | 35 |
| Anthrax | - | - | - | - | Malaria, falciparum | 2 | 2 | 2 | 3 |
| Biological warfare agent exposure | - | - | - | - | Malaria, malariae | - | - | - | - |
| Botulism | - | - | - | - | Malaria, ovale | - | - | - | - |
| Brucellosis | - | - | - | - | Malaria, unspecified | 1 | - | 8 | 2 |
| Campylobacter | 21 | 20 | 37 | 40 | Malaria, vivax | 6 | 2 | 9 | 35 |
| Carbon monoxide poisoning | 4 | 1 | 2 | 1 | Measles | - | 1 | - | - |
| Chemical agent exposure | - | - | - | - | Meningococcal meningitis | 1 | 4 | - | 1 |
| Chlamydia genital infection | 1975 | 2767 | 2618 | 1772 | Meningococcal septicemia | - | - | - | - |
| Cholera | - | - | - | - | Mumps | - | 3 | 1 | - |
| Coccidioidomycosis | - | 1 | 1 | 1 | Pertussis | - | 1 | 8 | 4 |
| Cold weather, frostbite | 19 | 18 | 1 | - | Plague | - | - | - | - |
| Cold weather, hypothermia | 1 | 3 | - | - | Pneumococcal pneumonia | 1 | 1 | 3 | 1 |
| Cold weather, immersion type | 19 | 8 | 1 | - | Poliomyelitis | - | - | - | - |
| Cold weather, unspecified | - | 21 | - | - | Q fever | - | - | - | - |
| Cryptosporidiosis | - | - | - | 2 | Rabies, human | - | - | - | - |
| Cyclospora | - | - | 1 | - | Relapsing fever | - | - | - | - |
| Dengue fever | - | - | 1 | 1 | Rheumatic fever, acute | - | 1 | - | - |
| Diphtheria | - | - | - | - | Rift valley fever | - | - | - | - |
| E. coli O157:H7 | 6 | 2 | 4 | 8 | Rocky mountain spotted fever | - | - | - | - |
| Ehrlichiosis | - | - | 2 | 1 | Rubella | 1 | - | - | - |
| Encephalitis | 1 | - | 1 | - | Salmonellosis | 38 | 27 | 52 | 76 |
| Filariasis | - | - | - | - | Schistosomiasis | - | - | 1 | - |
| Giardiasis | 18 | 17 | 10 | 20 | Shigellosis | 24 | 13 | 18 | 12 |
| Gonorrhea | 529 | 669 | 671 | 502 | Smallpox | - | - | - | - |
| H. influenzae, invasive | 4 | 2 | 1 | 3 | Streptococcus, group A, invasive | 3 | 1 | 3 | 1 |
| Hantavirus infection | 1 | - | - | - | Syphilis, congenital | 1 | 1 | 1 | - |
| Heat exhaustion | 4 | 3 | 142 | 157 | Syphilis, latent | 11 | 7 | 18 | 4 |
| Heat stroke | 3 | 1 | 23 | 25 | Syphilis, primary/secondary | 17 | 20 | 8 | 9 |
| Hemorrhagic fever | - | - | - | - | Syphilis, tertiary | 4 | 3 | 2 | 5 |
| Hepatitis A | 2 | 4 | 3 | 3 | Tetanus | - | - | - | - |
| Hepatitis B | 2 | 14 | 12 | 8 | Toxic shock syndrome | - | 1 | - | - |
| Hepatitis C | 13 | 22 | 13 | 4 | Trichinosis | - | - | - | - |
| Influenza | 93 | 201 | 3 | - | Trypanosomiasis | - | - | - | - |
| Lead poisoning | 3 | 3 | - | 1 | Tuberculosis, pulmonary | 8 | 7 | 3 | 4 |
| Legionellosis | 1 | 1 | - | - | Tularemia | - | - | 1 | 1 |
| Leishmaniasis, cutaneous | - | - | - | - | Typhoid fever | - | - | - | - |
| Leishmaniasis, mucocutaneous | - | - | - | - | Typhus fever | - | - | - | - |
| Leishmaniasis, unspecified | - | - | - | - | Urethritis, non-gonococcal | 251 | 357 | 345 | 273 |
| Leishmaniasis, visceral | - | - | - | - | Vaccine, adverse event | 7 | 21 | 9 | 4 |
| Leprosy | - | - | - | - | Varicella, active duty only | 9 | 47 | 25 | 7 |
| Leptospirosis | - | - | 1 | 2 | Yellow fever | - | - | - | - |

1. Main and satellite clinics.

2. Events reported by October 7, 2000.

3. Tri-Service Reportable Events, Version 1.0, July 1998.

Note: Completeness and timeliness of reporting varies by facility.

Source: Army Reportable Medical Events System.

Table S2. Reportable events, US Army medical treatment facilities,¹ cumulative events for all beneficiaries, October 1998-September 1999 and October 1999-September 2000²

| Diagnosis ³ | 1998-1999 | | 1999-2000 | | Diagnosis ³ | 1998-1999 | | 1999-2000 | |
|-----------------------------------|-----------------|-------------|-----------------|-------------|----------------------------------|-----------------|-------|-----------------|-------|
| | AD ⁴ | Other | AD ⁴ | Other | | AD ⁴ | Other | AD ⁴ | Other |
| All reportable events | 7397 | 3362 | 8054 | 6484 | Listeriosis | - | 2 | - | - |
| Amebiasis | 1 | 1 | 1 | 2 | Lyme disease | 12 | 17 | 17 | 58 |
| Anthrax | - | - | - | - | Malaria, falciparum | 4 | 3 | 1 | 8 |
| Biological warfare agent exposure | - | - | - | - | Malaria, malariae | - | - | - | - |
| Botulism | - | - | - | - | Malaria, ovale | - | 1 | - | - |
| Brucellosis | - | - | - | - | Malaria, unspecified | 4 | 1 | 8 | 3 |
| Campylobacter | 51 | 50 | 21 | 97 | Malaria, vivax | 54 | 5 | 45 | 7 |
| Carbon monoxide poisoning | - | - | 2 | 6 | Measles | - | 3 | - | 1 |
| Chemical agent exposure | - | - | - | - | Meningococcal meningitis | 6 | 1 | 3 | 3 |
| Chlamydia genital infection | 4296 | 2202 | 4969 | 4163 | Meningococcal septicemia | 6 | 14 | - | - |
| Cholera | - | - | - | - | Mumps | 1 | 1 | 2 | 2 |
| Coccidioidomycosis | 2 | 2 | - | 3 | Pertussis | - | 5 | 1 | 12 |
| Cold weather, frostbite | 86 | 1 | 33 | 5 | Plague | - | 1 | - | - |
| Cold weather, hypothermia | 12 | - | 3 | 1 | Pneumococcal pneumonia | 17 | 3 | 2 | 4 |
| Cold weather, immersion type | 8 | - | 27 | 1 | Poliomyelitis | - | - | - | - |
| Cold weather, unspecified | 2 | - | 21 | - | Q fever | - | - | - | - |
| Cryptosporidiosis | - | 1 | 1 | 1 | Rabies, human | - | - | - | - |
| Cyclospora | - | - | - | 1 | Relapsing fever | - | - | - | - |
| Dengue fever | 2 | 3 | 1 | 1 | Rheumatic fever, acute | - | 1 | - | 1 |
| Diphtheria | - | - | - | - | Rift valley fever | - | - | - | - |
| E. coli O157:H7 | 1 | 9 | 9 | 11 | Rocky mountain spotted fever | - | 3 | - | - |
| Ehrlichiosis | - | 1 | 1 | 2 | Rubella | 1 | 4 | - | 1 |
| Encephalitis | - | - | 1 | 1 | Salmonellosis | 48 | 129 | 34 | 159 |
| Filariasis | - | 1 | - | - | Schistosomiasis | - | - | 1 | - |
| Giardiasis | 20 | 44 | 15 | 50 | Shigellosis | 22 | 27 | 7 | 60 |
| Gonorrhea | 1347 | 486 | 1464 | 907 | Smallpox | - | - | - | - |
| H. influenzae, invasive | 3 | - | 2 | 8 | Streptococcus, group A, invasive | 1 | - | - | 8 |
| Hantavirus infection | 2 | - | - | 1 | Syphilis, congenital | 1 | 1 | 2 | 1 |
| Heat exhaustion | 205 | 30 | 215 | 91 | Syphilis, latent | 19 | 13 | 15 | 25 |
| Heat stroke | 67 | 4 | 33 | 19 | Syphilis, primary/secondary | 42 | 16 | 29 | 25 |
| Hemorrhagic fever | - | - | - | - | Syphilis, tertiary | 7 | 6 | 2 | 12 |
| Hepatitis A | 5 | 10 | 1 | 11 | Tetanus | - | - | - | - |
| Hepatitis B | 37 | 23 | 14 | 22 | Toxic shock syndrome | - | - | - | 1 |
| Hepatitis C | 14 | 23 | 5 | 47 | Trichinosis | - | - | - | - |
| Influenza | 74 | 128 | 15 | 282 | Trypanosomiasis | - | - | - | - |
| Lead poisoning | - | - | - | 7 | Tuberculosis, pulmonary | 6 | 16 | 6 | 16 |
| Legionellosis | 1 | 3 | - | 2 | Tularemia | - | - | 1 | 1 |
| Leishmaniasis, cutaneous | 3 | - | - | - | Typhoid fever | - | - | - | - |
| Leishmaniasis, mucocutaneous | - | - | - | - | Typhus fever | - | - | - | - |
| Leishmaniasis, unspecified | - | - | - | - | Urethritis, non-gonococcal | 823 | 44 | 923 | 303 |
| Leishmaniasis, visceral | - | - | - | - | Vaccine, adverse event | 20 | 4 | 34 | 7 |
| Leprosy | - | - | - | - | Varicella, active duty only | 64 | 15 | 67 | 21 |
| Leptospirosis | - | 4 | - | 3 | Yellow fever | - | - | - | - |

1. Main and satellite clinics.

2. Events reported by October 7, 2000.

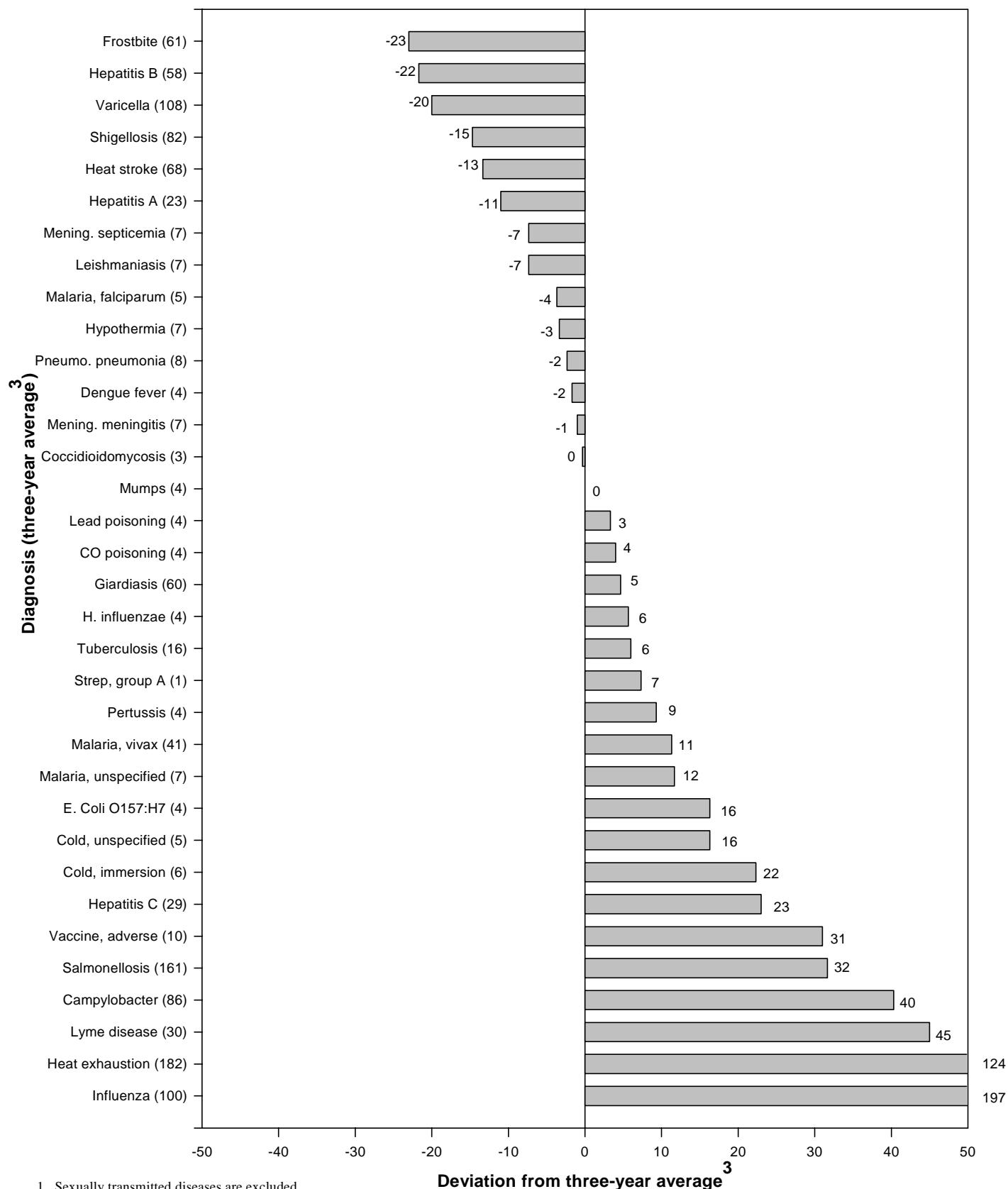
3. Tri-Service Reportable Events, Version 1.0, July 1998.

4. Active duty personnel.

Note: Completeness and timeliness of reporting varies by facility.

Source: Army Reportable Medical Events System.

Figure S1. Reportable events,¹ US Army medical treatment facilities, October 1999-September 2000² compared to the three-year average,³ 1996-1999



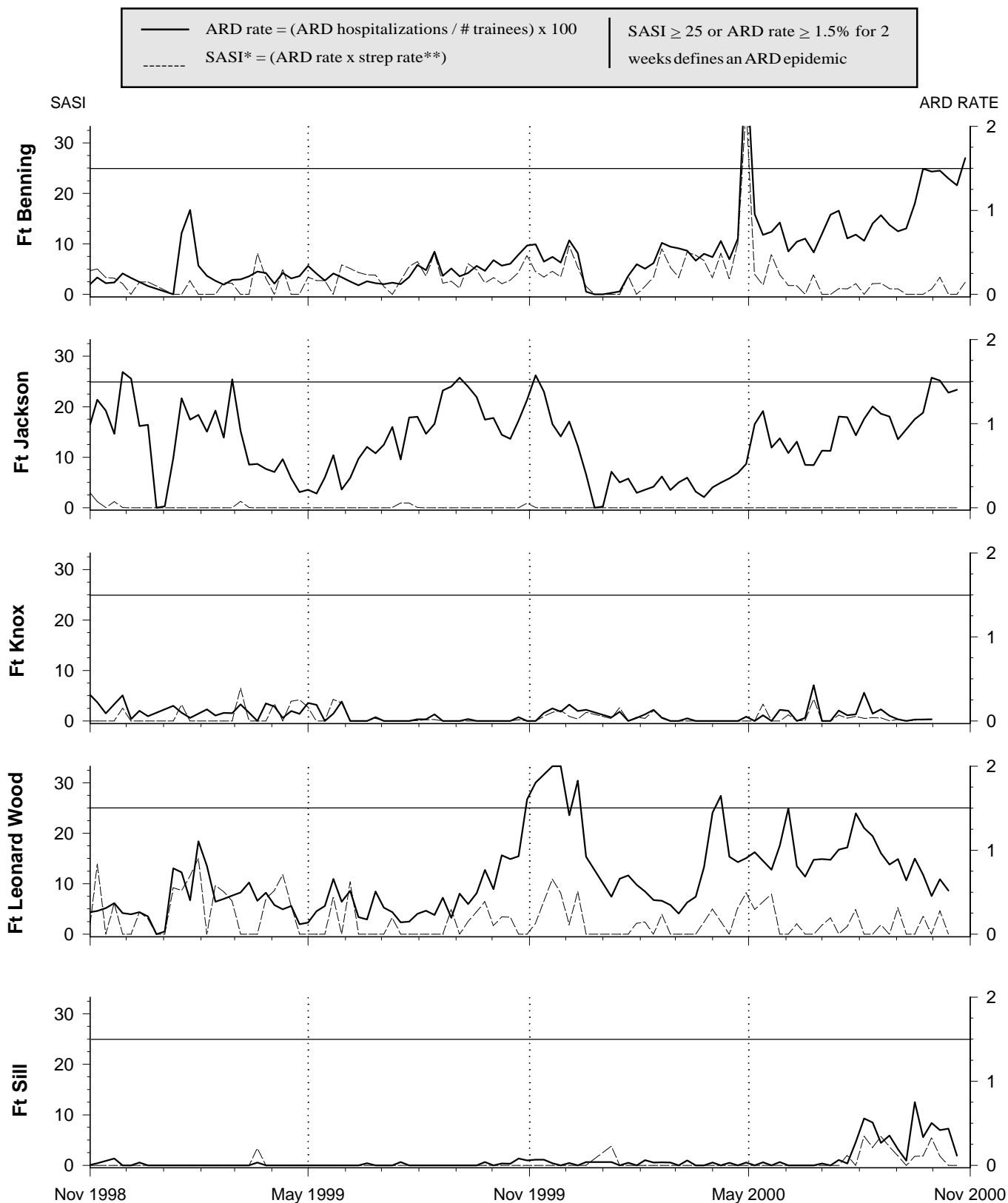
1. Sexually transmitted diseases are excluded.

2. Reported by October 7, 2000.

3. Comparisons given for diseases that had a total four year incidence of at least 10 cases. All averages are rounded to the nearest integer.

Source: Army Reportable Medical Events System

**Figure II. Acute respiratory disease (ARD) surveillance update
US Army initial entry training centers**



* SASI (Strep ARD Surveillance Index) is a reliable predictor of serious strep-related morbidity

** Strep rate = (Group A beta-hemolytic strep(+) / # cultures) x 100

Assault-related Hospitalizations, Active Duty Military Personnel, 1990-1998 (Revised)

Figure 1 below and table 1 of this article, which originally appeared in the August 2000 issue, were

revised. The online version of the August issue has been updated to reflect these changes.

Figure 1. Crude rates of assault-related hospitalizations, in demographic- and military-defined subgroups, active duty, US Armed Forces, 1990-1999

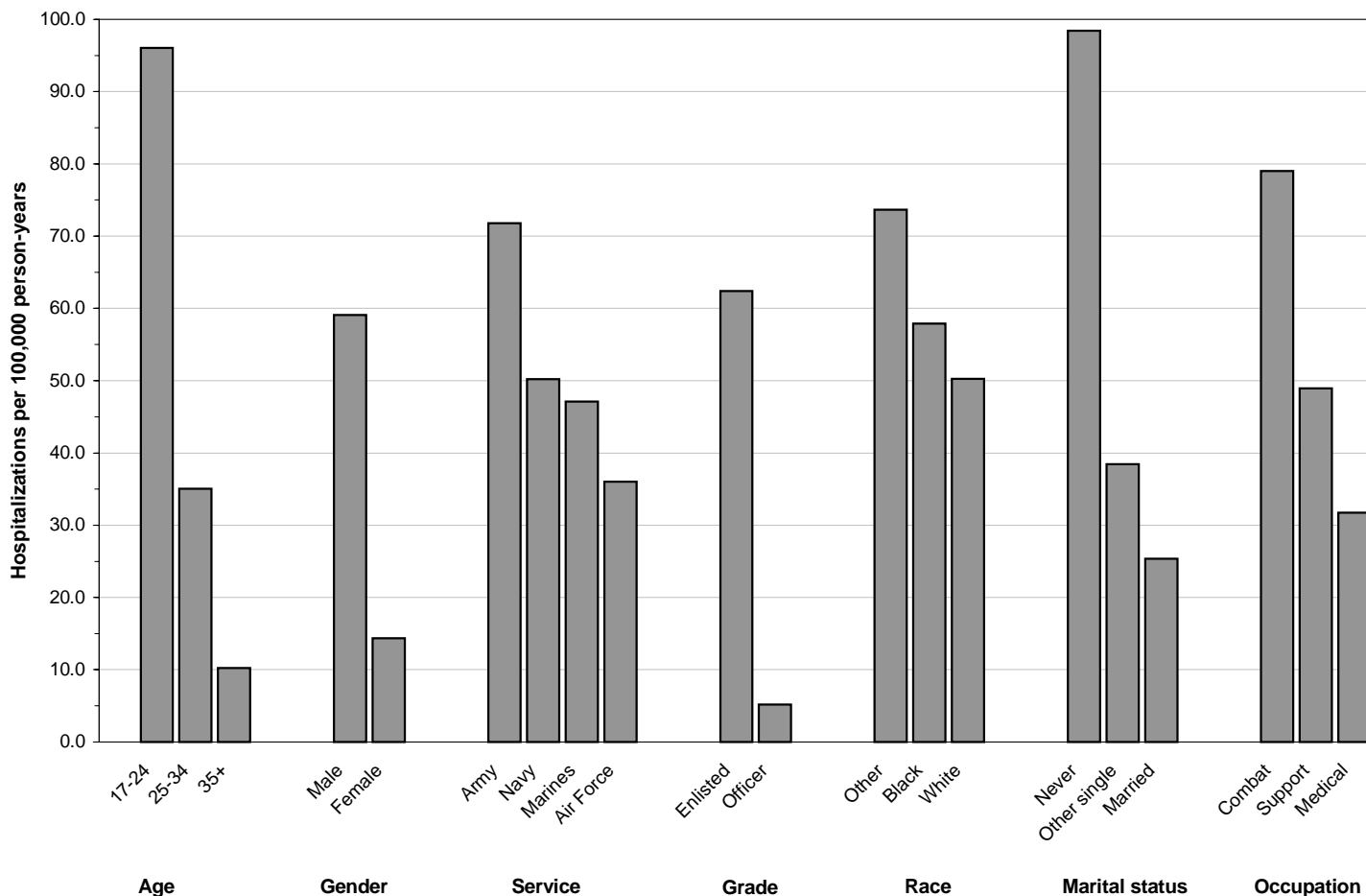


Table 1. Rates of assault-related hospitalizations among active duty servicemembers, 1990-1999

| Characteristics | Male | | | | | | | | Female | | | | | | | | Total | |
|-----------------|-------|-------|-------|------|-----|------|----------|-------|--------|------|-------|------|-----|------|----------|------|-------|------|
| | 17-24 | | 25-34 | | 35+ | | Subtotal | | 17-24 | | 25-34 | | 35+ | | Subtotal | | | |
| | N | Rate | N | Rate | N | Rate | N | Rate | N | Rate | N | Rate | N | Rate | N | Rate | N | Rate |
| Total | 6,010 | 107.7 | 2,129 | 38.2 | 350 | 10.9 | 8,489 | 59.1 | 169 | 19.8 | 105 | 13.2 | 15 | 4.1 | 289 | 14.3 | 8,778 | 53.6 |
| Service | | | | | | | | | | | | | | | | | | |
| Army | 2,727 | 141.4 | 1,020 | 52.9 | 155 | 14.6 | 3,902 | 79.3 | 81 | 26.4 | 65 | 21.7 | 9 | 7.1 | 155 | 21.2 | 4,057 | 71.8 |
| Marines | 522 | 51.3 | 258 | 54.2 | 53 | 24.7 | 833 | 48.8 | 11 | 21.0 | 1 | 3.8 | 1 | 11.4 | 13 | 14.8 | 846 | 47.1 |
| Navy | 1,523 | 92.6 | 632 | 39.8 | 124 | 13.9 | 2,279 | 55.2 | 36 | 15.4 | 17 | 8.6 | 4 | 4.3 | 57 | 10.9 | 2,336 | 50.2 |
| Air Force | 1,238 | 125.1 | 219 | 13.9 | 18 | 1.7 | 1,475 | 40.9 | 41 | 15.9 | 22 | 8.0 | 1 | 0.7 | 64 | 9.5 | 1,539 | 35.9 |
| Grade | | | | | | | | | | | | | | | | | | |
| Officer | 25 | 14.0 | 76 | 7.6 | 24 | 2.3 | 125 | 5.7 | 1 | 2.8 | 3 | 1.9 | 2 | 1.6 | 6 | 1.9 | 131 | 5.2 |
| Enlisted | 5,985 | 110.8 | 2,053 | 44.9 | 326 | 14.9 | 8,364 | 68.7 | 168 | 20.6 | 102 | 16.0 | 13 | 5.5 | 283 | 16.7 | 8,647 | 62.4 |
| Race | | | | | | | | | | | | | | | | | | |
| White | 4,234 | 101.2 | 1,352 | 33.5 | 213 | 9.0 | 5,799 | 54.8 | 87 | 16.3 | 47 | 10.0 | 9 | 3.8 | 143 | 11.5 | 5,942 | 50.2 |
| Black | 1,159 | 117.2 | 536 | 47.9 | 96 | 16.8 | 1,791 | 66.9 | 71 | 28.3 | 48 | 17.7 | 5 | 4.7 | 124 | 19.7 | 1,915 | 57.9 |
| Other | 617 | 150.5 | 241 | 57.4 | 41 | 15.0 | 899 | 81.5 | 11 | 16.0 | 10 | 18.2 | 1 | 4.3 | 22 | 15.0 | 921 | 73.7 |
| Marital Status | | | | | | | | | | | | | | | | | | |
| Single | 5,043 | 127.2 | 911 | 76.3 | 68 | 32.1 | 6,022 | 112.1 | 115 | 20.5 | 32 | 12.5 | 3 | 3.6 | 150 | 16.7 | 6,172 | 98.4 |
| Married | 925 | 59.4 | 1,100 | 26.6 | 246 | 8.7 | 2,271 | 26.6 | 52 | 19.3 | 62 | 13.4 | 9 | 4.0 | 123 | 12.9 | 2,394 | 25.3 |
| Other | 42 | 110.5 | 118 | 56.0 | 36 | 24.1 | 196 | 49.3 | 2 | 10.5 | 11 | 14.4 | 3 | 5.2 | 16 | 10.4 | 212 | 38.4 |
| Occupation | | | | | | | | | | | | | | | | | | |
| Combat | 1,920 | 139.3 | 600 | 42.7 | 88 | 23.1 | 2,608 | 82.4 | 10 | 13.2 | 2 | 3.7 | 0 | 0.0 | 12 | 7.9 | 2,620 | 79.0 |
| Support | 3,864 | 98.7 | 1,414 | 37.3 | 237 | 9.3 | 5,515 | 53.8 | 132 | 20.5 | 75 | 13.0 | 9 | 3.7 | 216 | 14.8 | 5,731 | 48.9 |
| Medical | 226 | 79.2 | 115 | 30.7 | 25 | 8.8 | 366 | 38.7 | 27 | 20.5 | 28 | 16.7 | 6 | 5.9 | 61 | 15.2 | 427 | 31.7 |

Note: Rates are expressed as hospitalizations per 100,000 person-years.

Table I. Sentinel reportable events, US Army medical treatment facilities¹
Cumulative events for all beneficiaries, calendar years through September 30, 1999 and 2000²

| Reporting Facility | Number of reported events ³ | | Environmental | | | | Food- and Water-borne | | | | | | | |
|---------------------------|--|---------------|---------------|-----------|------------|------------|-----------------------|-----------|-----------|-----------|------------|------------|-----------|-----------|
| | | | Cold | | Heat | | Campylobacter | | Giardia | | Salmonella | | Shigella | |
| | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 |
| NORTH ATLANTIC RMC | | | | | | | | | | | | | | |
| Walter Reed AMC, DC | 146 | 155 | - | - | - | - | 3 | 2 | 5 | 6 | 2 | 9 | - | 5 |
| Aberdeen Prov. Grd., MD | 24 | 28 | - | - | - | - | - | - | - | - | - | - | - | - |
| FT Belvoir, VA | 175 | 170 | - | - | 2 | 8 | 8 | 11 | 8 | 5 | 9 | 7 | 3 | 2 |
| FT Bragg, NC | 997 | 1052 | 8 | - | 101 | 141 | 5 | 1 | 2 | - | 23 | 13 | - | 1 |
| FT Drum, NY | 173 | 138 | 15 | 9 | 3 | 1 | 1 | - | 4 | - | 1 | - | - | - |
| FT Eustis, VA | 166 | 174 | 1 | - | 3 | 8 | 1 | 4 | - | - | 4 | 5 | 1 | - |
| FT Knox, KY | 226 | 195 | 2 | - | 15 | 10 | 2 | 1 | 2 | 1 | 1 | 1 | 3 | - |
| FT Lee, VA | 127 | 196 | - | - | 1 | 1 | - | - | - | - | - | - | - | - |
| FT Meade, MD | 48 | 78 | - | - | - | - | - | - | - | - | - | 2 | - | - |
| West Point, NY | 51 | 88 | - | 1 | 2 | 1 | - | - | - | - | - | 3 | - | - |
| GREAT PLAINS RMC | | | | | | | | | | | | | | |
| Brooke AMC, TX | 341 | 234 | - | - | 9 | 4 | - | 2 | - | 4 | 7 | 4 | 4 | 5 |
| Beaumont AMC, TX | 219 | 243 | - | - | 5 | 6 | - | - | - | - | 4 | 7 | - | 3 |
| FT Carson, CO | 573 | 478 | 2 | - | - | - | 4 | 1 | 9 | 1 | 6 | 1 | 1 | 6 |
| FT Hood, TX | 1056 | 1401 | - | 1 | 7 | 32 | 2 | 3 | 1 | 1 | 7 | 9 | 3 | 4 |
| FT Huachuca, AZ | 34 | 23 | - | - | 2 | 1 | - | - | - | - | 1 | - | 1 | - |
| FT Leavenworth, KS | 17 | 22 | - | - | - | 2 | 2 | 1 | 1 | 2 | - | 1 | - | - |
| FT Leonard Wood, MO | 133 | 136 | 3 | 3 | 2 | 10 | - | 1 | 1 | 1 | 2 | - | - | - |
| FT Polk, LA | 171 | 226 | - | - | 1 | 4 | - | - | - | - | - | - | - | - |
| FT Riley, KS | 219 | 157 | 1 | 22 | 11 | 1 | - | - | - | - | - | - | - | - |
| FT Sill, OK | 237 | 251 | - | - | 9 | 8 | - | - | - | - | - | - | 1 | - |
| SOUTHEAST RMC | | | | | | | | | | | | | | |
| Eisenhower AMC, GA | 168 | 233 | 1 | - | 4 | 1 | - | - | - | - | 1 | 2 | - | - |
| FT Benning, GA | 326 | 262 | - | - | 99 | 51 | 1 | 1 | 2 | 1 | 11 | 11 | 2 | - |
| FT Campbell, KY | 236 | 357 | 2 | 2 | 9 | 3 | 6 | 3 | 1 | 5 | 2 | 16 | 10 | 12 |
| FT Jackson, SC | 381 | 347 | - | - | - | 1 | - | - | - | - | 1 | - | - | - |
| FT Rucker, AL | 43 | 63 | - | - | 4 | 1 | - | - | - | - | - | 3 | 1 | - |
| FT Stewart, GA | 283 | 430 | - | - | 3 | 26 | - | - | - | - | 2 | 5 | - | - |
| WESTERN RMC | | | | | | | | | | | | | | |
| Madigan AMC, WA | 354 | 560 | - | - | - | - | - | 5 | 1 | 5 | - | 2 | 1 | 1 |
| FT Irwin, CA | 31 | 43 | - | - | - | - | - | - | - | - | - | - | - | - |
| FT Wainwright, AK | 109 | 79 | 42 | 4 | - | - | - | - | - | - | - | - | - | - |
| OTHER LOCATIONS | | | | | | | | | | | | | | |
| Tripler, HI | 436 | 629 | - | - | 1 | 3 | 22 | 35 | 12 | 6 | 9 | 10 | 1 | - |
| Europe | 502 | 1268 | 3 | 5 | - | - | 16 | 13 | - | 2 | 9 | 24 | 3 | 1 |
| Korea | 377 | 424 | 8 | 2 | 5 | 5 | - | - | - | - | - | 5 | - | - |
| Total | 8,379 | 10,140 | 88 | 49 | 298 | 329 | 73 | 84 | 49 | 40 | 102 | 140 | 35 | 40 |

1. Main and satellite clinics.

2. Events reported by October 7, 1999 and 2000.

3. Tri-Service Reportable Events, Version 1.0, July 1999.

Table I. (Cont'd) Sentinel reportable events, US Army medical treatment facilities¹
Cumulative events for all beneficiaries, calendar years through September 30, 1999 and 2000²

| Arthropod-borne | | | | Vaccine Preventable | | | | | | Sexually Transmitted | | | | | | | |
|-----------------|-----------|-----------|-----------|---------------------|-----------|-------------|-----------|-----------|-----------|----------------------|--------------|--------------|--------------|-----------------------|-----------|------------|------------|
| Lyme Disease | | Malaria | | Hepatitis A | | Hepatitis B | | Varicella | | Chlamydia | | Gonorrhea | | Syphilis ⁴ | | Urethritis | |
| Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 | Cum. 1999 | Cum. 2000 |
| 1 | 3 | 4 | - | 1 | 1 | - | 1 | 3 | 3 | 73 | 51 | 16 | 21 | 3 | 1 | 1 | - |
| - | 3 | - | - | - | - | - | 2 | 1 | 1 | 8 | 11 | 13 | 3 | - | 2 | 2 | 2 |
| - | - | - | - | 1 | - | - | 3 | - | 1 | 109 | 100 | 32 | 19 | - | 3 | - | - |
| 4 | 1 | 3 | 6 | - | - | - | - | 1 | 4 | 447 | 392 | 207 | 197 | 2 | 3 | 190 | 289 |
| - | - | 3 | 1 | - | - | - | - | 6 | 5 | 90 | 86 | 44 | 33 | - | - | 3 | 2 |
| - | 1 | - | - | - | - | 1 | 1 | 1 | 1 | 115 | 124 | 36 | 26 | - | - | - | - |
| - | - | - | - | - | - | - | 1 | 1 | 6 | 149 | 136 | 48 | 36 | 1 | 1 | - | - |
| - | - | - | - | - | 1 | 1 | - | - | - | 100 | 149 | 22 | 45 | 3 | - | - | - |
| 2 | - | - | - | - | - | - | - | 1 | - | 39 | 56 | 4 | 11 | - | - | - | 1 |
| 12 | 32 | - | - | - | - | 1 | 1 | 1 | 2 | 31 | 35 | 3 | 9 | - | 1 | - | - |
| 2 | - | 2 | 2 | 3 | - | 4 | - | 2 | 2 | 139 | 128 | 47 | 41 | - | 2 | 1 | - |
| - | - | 1 | - | 1 | 3 | - | - | 2 | 1 | 174 | 180 | 16 | 33 | - | - | 11 | 4 |
| - | - | - | 1 | - | - | 1 | - | 1 | - | 410 | 375 | 70 | 55 | - | - | 64 | 32 |
| - | - | 3 | 1 | 1 | 1 | 1 | 1 | 3 | 2 | 616 | 738 | 168 | 274 | 4 | 1 | 206 | 311 |
| - | - | - | - | 1 | - | - | - | - | - | 26 | 16 | 2 | 6 | - | - | - | - |
| - | 1 | - | - | - | - | - | - | - | - | 11 | 12 | 3 | 1 | - | - | - | - |
| - | 1 | 1 | - | - | - | 1 | - | 10 | 13 | 78 | 67 | 19 | 28 | 1 | - | 8 | 8 |
| - | - | 1 | - | - | - | - | - | - | - | 135 | 198 | 30 | 24 | 2 | - | - | - |
| - | - | - | - | - | - | - | - | - | - | 152 | 88 | 55 | 42 | - | 1 | - | - |
| - | 2 | 1 | - | - | - | 6 | - | 6 | 4 | 126 | 140 | 51 | 47 | 2 | - | 27 | 39 |
| - | 2 | - | 3 | 1 | - | 3 | 3 | 2 | 2 | 137 | 168 | 12 | 14 | - | - | - | - |
| - | - | 1 | 8 | 1 | - | - | 1 | 1 | 6 | 104 | 113 | 73 | 64 | 1 | 3 | - | - |
| - | 1 | 5 | 8 | - | - | - | 1 | - | 2 | 122 | 175 | 79 | 121 | - | 1 | - | - |
| - | - | - | - | - | - | - | - | 6 | 3 | 312 | 304 | 48 | 37 | 6 | - | - | - |
| - | - | - | 1 | - | - | - | - | - | - | 27 | 40 | 11 | 14 | - | - | - | - |
| - | - | 4 | 1 | - | - | - | - | 4 | - | 92 | 146 | 56 | 94 | - | - | 120 | 155 |
| - | 2 | 5 | 4 | - | 1 | - | 2 | - | - | 203 | 363 | 44 | 50 | - | - | 90 | 103 |
| - | - | - | 1 | - | - | 5 | - | - | 1 | 22 | 34 | 4 | 6 | - | 1 | - | - |
| - | - | 1 | - | - | - | 1 | - | 2 | - | 53 | 72 | 8 | 2 | - | - | - | - |
| - | - | 4 | 3 | - | 1 | 1 | 2 | - | 1 | 269 | 433 | 68 | 74 | - | - | - | 1 |
| 6 | 8 | 2 | - | 2 | - | 3 | 7 | 4 | 9 | 350 | 972 | 89 | 208 | - | 2 | 1 | - |
| - | - | 16 | 12 | - | - | 14 | 1 | 3 | 1 | 281 | 332 | 11 | 35 | 15 | 11 | - | 9 |
| 27 | 57 | 57 | 52 | 12 | 8 | 43 | 27 | 61 | 70 | 5,000 | 6,234 | 1,389 | 1,670 | 40 | 33 | 724 | 956 |

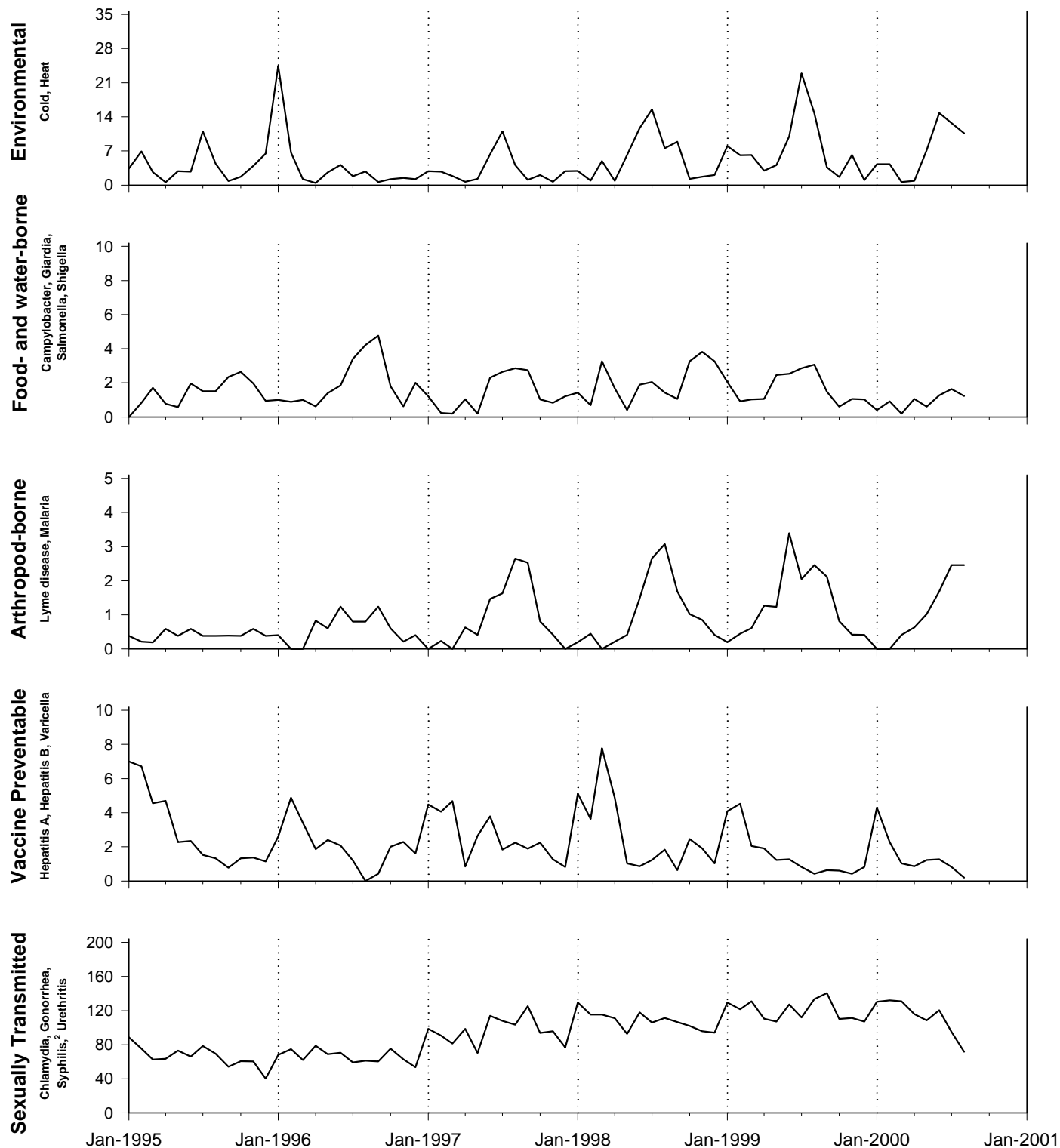
4. Primary and Secondary

Note: Completeness and timeliness of reporting varies by facility.

Source: Army Reportable Medical Events System.

Figure I. Sentinel reportable events (grouped), active duty soldiers, January 1995 - August 2000¹

Cases / 10,000 person-years



1. Events reported by September 7, 2000.

2. Primary and Secondary.

Table S2. Active duty force strength by MTF, US Army, June 2000

| MTF/Post ² | Males | | | | | | | Females | | | | | | | All |
|---------------------------|-------|--------|-------|-------|-------|-------|---------------------|---------|-------|-------|-------|-------|-------|--------------------|---------------------|
| | < 20 | 20-24 | 25-29 | 30-34 | 35-39 | >= 40 | Total | < 20 | 20-24 | 25-29 | 30-34 | 35-39 | >= 40 | Total | |
| NORTH ATLANTIC RMC | | | | | | | | | | | | | | | |
| Walter Reed AMC, DC | 140 | 3117 | 2173 | 1801 | 1969 | 3202 | 12402 | 70 | 802 | 717 | 545 | 530 | 658 | 3322 | 15724 |
| Aberdeen Prov. Ground, MD | 343 | 651 | 319 | 328 | 376 | 329 | 2346 | 50 | 108 | 73 | 59 | 47 | 45 | 382 | 2728 |
| FT Belvoir, VA | 18 | 187 | 253 | 263 | 321 | 394 | 1436 | 7 | 71 | 104 | 80 | 69 | 81 | 412 | 1848 |
| FT Bragg, NC | 2119 | 11835 | 7846 | 5706 | 4334 | 2394 | 34234 | 304 | 1671 | 1153 | 652 | 464 | 249 | 4493 | 38727 |
| FT Drum, NY | 669 | 3972 | 2347 | 1372 | 1054 | 524 | 9938 | 159 | 455 | 234 | 147 | 91 | 52 | 1138 | 11076 |
| FT Eustis, VA | 541 | 1874 | 1249 | 974 | 938 | 816 | 6392 | 145 | 554 | 328 | 205 | 159 | 124 | 1515 | 7907 |
| FT Knox, KY | 1107 | 2958 | 1699 | 1347 | 1376 | 790 | 9277 | 44 | 258 | 203 | 155 | 109 | 73 | 842 | 10119 |
| FT Lee, VA | 478 | 1051 | 660 | 513 | 490 | 399 | 3591 | 324 | 533 | 288 | 163 | 127 | 96 | 1531 | 5122 |
| FT Meade, MD | 90 | 713 | 808 | 787 | 654 | 779 | 3831 | 41 | 270 | 260 | 203 | 161 | 129 | 1064 | 4895 |
| West Point, NY | 15 | 244 | 224 | 617 | 512 | 543 | 2155 | 12 | 55 | 66 | 118 | 75 | 72 | 398 | 2553 |
| GREAT PLAINS RMC | | | | | | | | | | | | | | | |
| Brooke AMC, TX | 198 | 785 | 926 | 945 | 840 | 948 | 4642 | 193 | 461 | 411 | 370 | 297 | 312 | 2044 | 6686 |
| Beaumont AMC, TX | 468 | 2413 | 1743 | 1296 | 1135 | 1045 | 8100 | 135 | 608 | 396 | 211 | 184 | 150 | 1684 | 9784 |
| FT Carson, CO | 724 | 4679 | 3225 | 2089 | 1599 | 878 | 13194 | 152 | 716 | 418 | 213 | 167 | 94 | 1760 | 14954 |
| FT Hood, TX | 2421 | 12926 | 8117 | 5150 | 3874 | 2203 | 34691 | 588 | 2306 | 1470 | 806 | 600 | 371 | 6141 | 40832 |
| FT Huachuca, AZ | 469 | 1289 | 933 | 613 | 541 | 430 | 4275 | 162 | 372 | 215 | 116 | 87 | 84 | 1036 | 5311 |
| FT Leavenworth, KS | 34 | 258 | 225 | 320 | 664 | 501 | 2002 | 17 | 73 | 49 | 53 | 79 | 56 | 327 | 2329 |
| FT Leonard Wood, MO | 1639 | 2154 | 1265 | 1198 | 1066 | 603 | 7925 | 555 | 678 | 329 | 222 | 146 | 91 | 2021 | 9946 |
| FT Polk, LA | 478 | 2610 | 1574 | 1339 | 848 | 396 | 7245 | 105 | 446 | 256 | 142 | 92 | 74 | 1115 | 8360 |
| FT Riley, KS | 691 | 3746 | 2098 | 1280 | 937 | 490 | 9242 | 102 | 385 | 242 | 142 | 113 | 60 | 1044 | 10286 |
| FT Sill, OK | 1476 | 3654 | 2180 | 1536 | 1269 | 760 | 10875 | 178 | 461 | 300 | 207 | 125 | 66 | 1337 | 12212 |
| SOUTHEAST RMC | | | | | | | | | | | | | | | |
| Eisenhower AMC, GA | 1066 | 2243 | 1498 | 1180 | 1124 | 1183 | 8294 | 196 | 635 | 448 | 344 | 309 | 251 | 2183 | 10477 |
| FT Benning, GA | 3616 | 5563 | 3154 | 2155 | 1500 | 759 | 16747 | 95 | 530 | 349 | 229 | 158 | 83 | 1444 | 18191 |
| FT Campbell, KY | 1196 | 7387 | 5256 | 3558 | 2523 | 1190 | 21110 | 225 | 1048 | 684 | 364 | 235 | 102 | 2658 | 23768 |
| FT Jackson, SC | 1719 | 1927 | 979 | 909 | 777 | 447 | 6758 | 1253 | 1103 | 497 | 341 | 201 | 89 | 3484 | 10242 |
| FT McClellan, AL | 172 | 193 | 126 | 141 | 212 | 230 | 1074 | 26 | 33 | 34 | 34 | 30 | 29 | 186 | 1260 |
| FT Rucker, AL | 93 | 727 | 1077 | 613 | 530 | 434 | 3474 | 46 | 205 | 162 | 80 | 51 | 33 | 577 | 4051 |
| FT Stewart, GA | 1261 | 6301 | 3896 | 2408 | 1859 | 920 | 16645 | 203 | 1091 | 674 | 396 | 267 | 150 | 2781 | 19426 |
| WESTERN RMC | | | | | | | | | | | | | | | |
| Madigan AMC, WA | 1180 | 5529 | 3636 | 2536 | 1976 | 1363 | 16220 | 272 | 999 | 635 | 369 | 254 | 204 | 2733 | 18953 |
| FT Irwin, CA | 172 | 1513 | 990 | 726 | 565 | 310 | 4276 | 32 | 194 | 125 | 84 | 51 | 27 | 513 | 4789 |
| FT Wainwright, AK | 396 | 1949 | 1525 | 846 | 529 | 322 | 5567 | 71 | 339 | 223 | 132 | 113 | 49 | 927 | 6494 |
| OTHER LOCATIONS | | | | | | | | | | | | | | | |
| Tripler, HI | 828 | 4304 | 3319 | 2002 | 1522 | 981 | 12956 | 187 | 844 | 695 | 378 | 257 | 216 | 2577 | 15533 |
| Europe | 2616 | 14522 | 13067 | 8320 | 6474 | 4070 | 49069 | 670 | 3145 | 2284 | 1349 | 1019 | 611 | 9078 | 58147 |
| Korea | 1920 | 8227 | 5797 | 4218 | 3633 | 2365 | 26160 | 519 | 1536 | 1003 | 662 | 582 | 372 | 4674 | 30834 |
| Other/Unknown | 844 | 2988 | 3966 | 6214 | 6303 | 4399 | 24714 | 233 | 567 | 665 | 738 | 668 | 479 | 3350 | 28087 |
| Total | 31197 | 124489 | 88150 | 65300 | 54324 | 37397 | 400857 [§] | 7371 | 23552 | 15990 | 10309 | 7917 | 5632 | 70771 [§] | 471651 [§] |

1. Based on duty zip code. Does not account for TDY.

§ Includes unknown age groups and unknown gender.

2. Includes any subordinate catchment areas not listed separately.

Source: Defense Manpower Data Center.

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